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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/688,338	10/17/2003	Peter Rae Shintani	81100/7114	2276

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FITCH EVEN TABIN & FLANNERY  
120 SOUTH LASALLE SUITE 1600  
CHICAGO, IL 60603

EXAMINER
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LONSBERRY, HUNTER B

ART UNIT	PAPER NUMBER
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2623

SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE
3 MONTHS	04/06/2007	PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

**Office Action Summary**

Application No.

10/688,338

Applicant(s)

SHINTANI, PETER RAE

Examiner

Hunter B. Lonsberry

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– The MAILING DATE of this communication appears on the cover sheet with the correspondence address –

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 04 January 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-20 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date 12/11/06
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_\_

## **DETAILED ACTION**

### ***Response to Arguments***

Applicant's arguments filed 1/4/07 have been fully considered but they are not persuasive.

Applicant argues that the combination of Johnson and Shintani fails to describe selecting a first single modulation scheme of a plurality of modulations schemes on the first input (pages 8-9).

The Examiner disagrees. As correctly noted by the applicant, Johnson discloses that data from multiple sources may be received over a first input, and that the sources received over that input may be selected to be only certain signal sources (page 6, lines 12-21, only UHF inputs, only a certain range of channels, only DBS/STB connections etc) and further discloses tuning to a plurality of channels, recording the receivable channels in a channel map and not performing a full auto-program (Page 5, Lines 29-31; Page 6, Lines 1-21).

The Johnson reference discloses that the system may only accept signals with particular characteristic (e.g. modulation scheme) (Page 6, Lines 13-19); however, the reference is silent with respect to scanning a first modulation scheme on a first input.

The Shintani et al. reference provides evidence that it is known to scan a first modulation scheme on a first input so as to reduce the auto program time (Figure 5, Col

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4, Lines 20-41, The system scans only the NTSC channels and not all modulation schemes see figure 6 ). Accordingly, a modification to the Johnson reference so as to implement scanning a first modulation scheme on a first input such as that offered by Shintani et al. would have been obvious to one of ordinary skill in the art for the stated advantage.

Thus the combination of Johnson and Shintani would only scan for a certain modulation scheme for a particular input and therefore teaches each and every element of the claims.

Applicant argues that there is no motivation to combine Johnson and Shintani (pages 10-11).

In response to applicant's argument that there is no suggestion to combine the references, the examiner recognizes that obviousness can only be established by combining or modifying the teachings of the prior art to produce the claimed invention where there is some teaching, suggestion, or motivation to do so found either in the references themselves or in the knowledge generally available to one of ordinary skill in the art. See *In re Fine*, 837 F.2d 1071, 5 USPQ2d 1596 (Fed. Cir. 1988) and *In re Jones*, 958 F.2d 347, 21 USPQ2d 1941 (Fed. Cir. 1992). In this case, Johnson discloses restricting the type of input to only UHF inputs, only a certain range of channels, only DBS/STB connections etc . The Shintani et al. reference provides evidence that it is known to scan a first modulation scheme on a first input so as to

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reduce the auto program time (Figure 5, Col 4, Lines 20-41). The combination of Shintani with Johnson provides an advantage in that programming time is reduced. Therefore the combination of Johnson and Shintani is proper and teaches each and every element of the claims.

Applicant argues that Johnson fails to discuss selecting a plurality of signals to evaluate and limiting the channel map to that signal, but rather performs a channel search on a television having multiple input signals where a channel search is preformed only on the currently selected signal. Further Shintani does not describe limiting the channel map to a single signal. (pages 11-12).

The independent claims merely required selecting a first input of a plurality of inputs, and selecting a single modulation scheme of a plurality of modulation schemes on a first input. As correctly noted by applicant, Johnson discloses selecting a single input and *scanning only that input*, further Johnson discloses that the input may carry only UHF inputs, only a certain range of channels, only DBS/STB connections etc. Shintani discloses scanning only a certain modulation scheme. The combination of Johnson and Shintani would result in only the data carried on a single input to be scanned for a certain modulation scheme. The Examiner is confused how a range of channels, UHF signals, only DBS/STB input and scanning only that range of signals with a certain modulation scheme is not equivalent to applicant's invention.

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Applicants traversed the official notices taken in claims 4-6 with respect to respect to comparing the scanned channel with the mapped channels and initiating the tuning, the determining and recording when a difference is detected. (page 14)

The Examiner relies upon US Patent 6,775,843 to McDermott to teach these features.

Applicant argues that Shintani fails to teach determining whether or not a channel map exists (page 15).

The Examiner disagrees. Shintani discloses that when a conventional receiver is powered up for the first time, the program map contains no channel data(column 1, lines 13-19). In response to a user command to auto program, the channel map data is then programmed in (column 3, line 65-column 4, line 20).

### ***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-13 and 15-20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Johnson (WO 01/06771) in view of Shintani et al. (US Pat No 6,137,546).

In regard to claims 1-2, 9, 12 and 17-18, the Johnson reference discloses selecting a first input of a plurality of inputs (Page 2, Lines 25-28), tuning to a plurality of channels, recording the receivable channels in a channel map and not performing a full auto-program (Page 5, Lines 29-31; Page 6, Lines 1-21).

The Johnson reference discloses that the system may only accept signals with particular characteristic (e.g. modulation scheme) (Page 6, Lines 13-19); however, the reference is silent with respect to scanning a first modulation scheme on a first input.

The Shintani et al. reference provides evidence that it is known to scan a first modulation scheme on a first input so as to reduce the auto program time (Figure 5, Col 4, Lines 20-41). Accordingly, a modification to the Johnson reference so as to implement scanning a first modulation scheme on a first input such as that offered by Shintani et al. would have been obvious to one of ordinary skill in the art for the stated advantage.

In regard to claim 3 and 7-8, the Johnson reference discloses determining if the channel map includes an assignment for a first tune channel, identifying a channel name associated with the first tuned channel and replacing the assignment with the first tuned channel and recording the channel and the channel name in the channel map (Page 6, Lines 1-11).

In regard to claims 4-6, as aforementioned, the combined teaching discloses the scanning a signal modulated by the first modulation scheme and identifying channels carrying broadcast information. However, the reference is silent with respect to comparing the scanned channel with the mapped channels and initiating the tuning, the

determining and recording when a difference is detected. The examiner takes official notice that it is notoriously well known in the art to utilize the particular usage of comparing current channel information to mapped information when updating in order efficiently maintain current information. Accordingly, the particular usage of comparing current channel information to mapped information when updating would have been obvious to one of ordinary skill in the art for the stated advantage.

In regard to claim 10, Johnson discloses that the channel map is limited to the selected input (Page 6, Lines 9-11).

In regard to claims 11-12, Johnson discloses determining if a signal quality meets a predefined threshold and recording the channels that have met the predefined threshold (Page 7, Lines 8-22).

In regard to claims 13, and 15-16, Shintani discloses determining if a channel map exists for the selected modulation scheme and tuning in a first or second channel not recorded in the map (Col 4, Lines 21-41). Johnson discloses determining if a signal quality meets a predefined threshold and initiating the generation of the map the channels that have met the predefined threshold (Page 7, Lines 8-22).

In regard to claim 19, the reference is silent with respect to the analog signal being NTSC and the digital signal being QAM. The examiner takes official notice that it is notoriously well known in the art to utilize the particular usage with respect to the analog signal being NTSC and the digital signal being QAM is well known in the art so as to conform to industry standers enabling interoperability. Accordingly, the particular



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usage of the analog signal being NTSC and the digital signal being QAM would have been obvious to one of ordinary skill in the art for the stated advantage.

In regard to claim 20, Johnson discloses a video processor coupled to the tuner and memory (Figure 1).

Claim 14 is rejected under 35 U.S.C. 103(a) as being unpatentable over Johnson (WO 01/06771) in view of Shintani et al. (US Pat No 6,137,546) in further view of U.S. Patent 6,775,843 to McDermott.

Regarding claim 14, the combination of Shintani and Johnson discloses selecting an input and autoprograming the channels for a particular modulation scheme.

Shintani and Johnson do not disclose determining the broadcaster of a second channel, comparing it with a stored recorded, determining if it is different and initiating the generating of the channel map for the entire selected signal when the determined broadcaster is different.

McDermott scans a number of virtual channels and physical channels to determine if the CTSID and TSID where generated in the mapping step correspond to one another, if they do not, the channel numbers are reallocated for the selected virtual channel signal (figure 4a, 6, column 5, lines 35-column 7, line 13), thereby reducing a conflict if a user selects that signal.

Therefore, it would have been obvious to one of ordinary skill in the art at the time of invention to modify the combination of Johnson and Shintani to utilize the

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mapping comparison features of McDermott for the advantage of reallocating the channel numbers so to prevent conflicts when a user tunes to that channel.

### ***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Hunter B. Lonsberry whose telephone number is 571-272-7298. The examiner can normally be reached on Monday-Friday during normal business hours.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, John Miller can be reached on 571-272-7353. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

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